

## Activity 2

### Playing Favourites

#### Activity focus

In this activity, students will conduct a simple data collection exercise (a survey) to answer the question: "What is the favourite NRL team of all the people in the group?"

They will conduct a sample survey and a class census, record their results and calculate team frequency.

#### What you will need

- Internet access is recommended
- Whiteboard/paper and markers

#### Statistical concepts

Population, survey, census, sample, tally

#### Activity instructions

- Introduce the concept of a **population** or target population. That is, the population you want to study or find out about (in this case, the target population is all the people in the group).
- Firstly, select a sample of 10 people from the population. Conduct a survey by asking the 10 people in the sample to indicate their favourite NRL team. Create a tally on the whiteboard.

This is an example of a tally:



- Discuss what the results indicate.
- Secondly, conduct a census. (To conduct the census, all the people not in the 'sample' should indicate their favourite team on the tally. Then the responses are brought together with the response from those in the sample to provide complete coverage for the whole population (this is known as a census).
- Discuss the results of the sample and census.
- You may also wish to discuss why collecting the data will help to answer the question about which NRL team is the favourite. Without data, how might we find out? Take a guess or assume that my favourite team is everyone's favourite? Are these ways reliable?

#### Additional information

- To reinforce the concepts of population, census and sample see the ABS Statistical Language web pages: <http://www.abs.gov.au/statlanguage>
- Definitions are provided in the Facilitator Guide and are also available on the ABS Statistical Language web pages.

